



Spark Gap

Vol. 36, Issue 1, January 2019 *MARC - Serving Central Indiana Communities for thirty-six years*

On Our MARC:

Welcome to 2019!!

Hope everyone had a good Holiday Season and Santa brought you what you asked for. I would like to thank everyone that brought something to eat to our December meeting. The food was great and I hope that everyone enjoyed the White Elephant exchange.

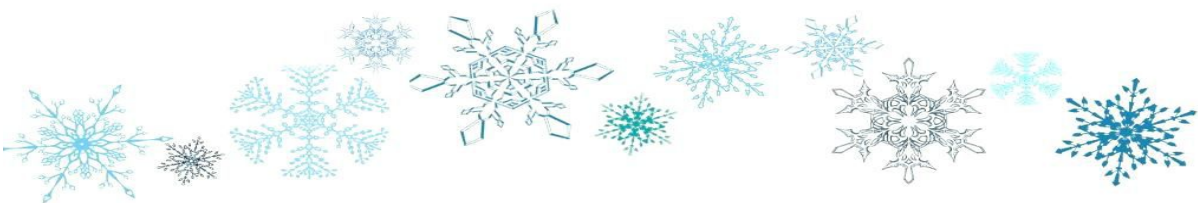
With a New Year, changes come. I would like to take a minute and let everyone know that Rusty, N9LLP, had resigned as the PIO officer at the December meeting. The Officers are in search of someone that would like to take over. At one time, we had four people on the PIO team and at the end, we only had one. Anyone interested in taking over, please let the officers know. At this time, I would like to thank Rusty for all the time and hard work he had put into the position.

Please mark your calendar for March 12th, 2019, we have a date for Johnson County Storm Spotter Weather Training. It will start at 7pm and will be held at the Johnson County Sheriff's Department Training Facility located at 1061 Hospital Road, Franklin, IN. Please take the drive from the Sheriff's Department parking lot to the east of the jail, drive through the gates and take the first left that will lead to the parking lot for the training facility. The entrance to the building is on the south side.

With the New Year, Club dues are due. Please see Ron, K9THR, about getting your dues current for 2019.

Hope to see you Saturday. The coffee will be on.

Jacki, KI6QOG
President





Birthdays for the month of January

KD9ALA - Ken Barr
KD9BHM - Marlys Barr
KC9WLF - Jim Busch
KB9BVN - Brian Murrey
N9EJR - Jim Williams
KB9UJE - Matt Payne
KC9ZMV - Cliff Whitrock

Winter Field Day 2019 is January 26 – 27

The Winter Field Day Association (WFDA) sponsors the 2019 running of Winter Field Day, January 26 – 27. WFDA says that the ability to conduct emergency communication in a winter environment is just as important as the preparation and practice that take place each summer, but with some additional unique operational concerns.

“We believe that maintaining your operational skills should not be limited to fair-weather scenarios,” WFDA said in announcing this year’s event. “The addition of Winter Field Day will enhance those already important skills of those that who generously volunteer their time and equipment to these organizations. Preparedness is the key to a professional and timely response during any event, and this is what local and state authorities are expecting when they reach out to emergency service groups that offer their services.”

Members of the Warren County (NY) Radio Club (WCARC) will activate Maxim Memorial Station W1AW during 2019 Winter Field Day. Club members will work a rotating 24-hour operating schedule to ensure the most band/mode coverage.

The event is open to all radio amateurs. For more information on this event please check the ARRL website. *ARRL News January 2019*



WINLINK CLASS

Indiana State Emergency Management Officials predict a major earthquake will strike the Hoosier state in our life time. Studies have shown Indiana soil during a quake will liquefy causing buildings and tower structures to fall.

That concern for loss of regional communications set the tone for the WinLink class on January 15th in the training room of White River Township Fire Station 51.

Ryan Rather, AB9MV and Jack W8ISH conducted the two hour class addressing the use of WinLink/Winmor. This free software allows the user to send messages, pictures or lists of needed supplies across the state or around the world. It was widely used in Puerto Rico during the aftermath of Hurricane Maria in September 2017. All normal communications on the island were destroyed. Eight MARC members attended the two hour class. On hand was Dave- KB9LOT, Ron-K9THR, Noel-W9NMM, Scott WA9DBA, Chris KQ9Y and new comers Darrell-KM9S.

Ryan Rather, AB9MV, is a Johnson county ham and is the newly appointed Communications Specialist for IDHS. Ryan says their focus at the Indiana DHS is to have trained disaster communication specialists in each county in case of a catastrophic communications failure.

Our group of eight hams has taken their first step to bridge that gap by being able to send and receive information via WinLink using the internet via Telnet, or by radio using VHF and HF. A system of servers established around the world allows hams to send emails without the internet. Ryan said maritime boats and ships often use Winmor on HF where there is no internet access. Additional classes and practice exercises are being planned. If you have an interest in this digital technology contact Jack-W8ISH. -w8ish



Darrell and class



Ryan shows his go box

..... Pictures by Jack, W8ISH

Collins PROUDLY ANNOUNCES a NEW STANDARD in AM, CW and SSB OPERATION

It took Collins to produce the first really new Amateur communication system, designed expressly for Single Sideband as well as AM and CW operation. Collins new 75A-4 Receiver/32W-1 Exciter or 75A-4 Receiver/KWS-1 Transmitter combinations are designed for the most exacting Amateur. Engineering-wise, the equipment meets the high standards Collins has set for military and commercial equipment. Price-wise, the Amateur will get more for his money than ever before. See your nearest Collins distributor for your brochure.

KWS-1 TRANSMITTER

Collins engineering plus extensive on-the-air tests account for the KWS-1 Transmitter's reliability and optimum performance in SSB, AM and CW operation. The exciter and RF power amplifier are housed in a single receiver size cabinet. The Collins 367A-1 linear RF power amplifier uses two 4X150A's in class AB operation. RF feedback is employed to improve the linearity characteristics of the power amplifier. The KWS-1 incorporates circuit application and components which have been proved in preceding Collins equipment; to note a few, the 70E VFO, the Pi-L output network, extremely accurate VFO dial and the Collins Mechanical Filters. To meet the Amateur's future desire for power increase, Collins 32W-1 Exciter can be modified to a KWS-1 at the factory.



COLLINS RADIO COMPANY

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1930 Hi-Line Drive, DALLAS 2

2700 West Olive Avenue, BURBANK

Collins Radio Company of Canada Ltd.

74 Sparks Street, OTTAWA, ONTARIO



A pick from the past in HAM Radio.

PACKET & APRS NEWS on ISS Space Station !

New Amateur Radio by KENWOOD on the International Space Station (ARISS) packet equipment (APRS) awaits unpacking and installation on board the station after arriving in November 2018 as part of the cargo transported via a Russian 71P Progress resupply vehicle.

The new packet module for NA1SS will replace the current packet gear, which has been intermittent over the past year.

“With the arrival of Progress complete, the crew has to find free time unpack Progress, uninstall the intermittent module, and then set up and test the replacement packet module,” explained Dan Barstow, KA1ARD, senior education manager of the ISS National Laboratory (CASIS), an ARISS sponsor.

The ISS packet system was reported to have gone down in July 2017, although it unexpectedly came back to life the following summer. At the time of the failure, NASA ISS Ham Radio Project Engineer Kenneth Ransom, N5VHO, said the revived system would fill the gap until the replacement packet module was launched and installed.

The packet system operates on 145.825 MHz.

ARISS hardware team members on the ground were able to locate a functional duplicate of the ISS packet module that has been in use on the ISS for 17 years. ARISS said the subsequent installation will depend on the crew's busy schedule.

In an email to ARISS and other groups CASIS supports, Barstow pointed out that ARISS is an official back-up system for astronauts to talk with Mission Control in the unlikely failure of the station's primary communication systems.

Barstow said that in 2017, hams relayed nearly 89,000 packet messages via the ISS — an average of 243 every day.

The statistic so intrigued and amazed Barstow that he decided to get his Amateur Radio license and gear to join in the activity.

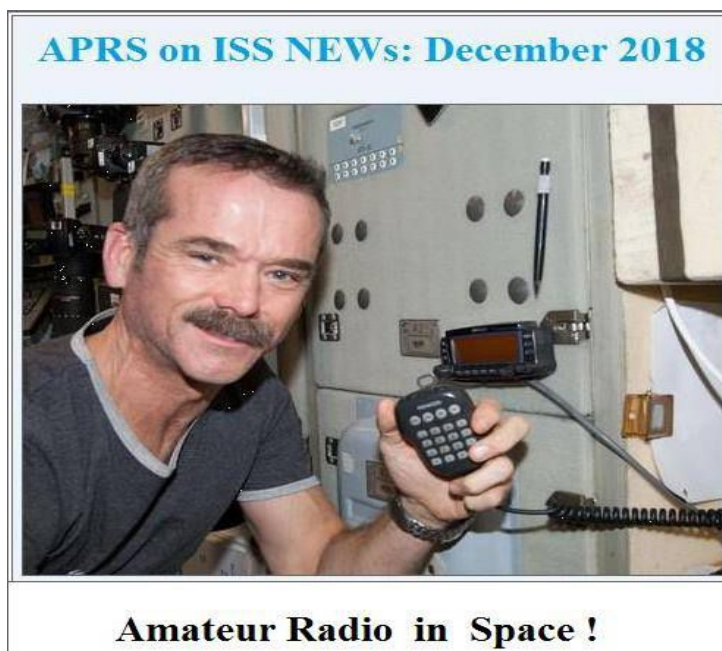
The crew members of the past mission Expedition #57 : Serena Auñón-Chancellor, KG5TMT, Alexander Gerst, KF5ONO, and cosmonaut Sergey Prokopyev are return to Earth on the past December 20 on a Soyuz TM vehicle.

Info by ARRL

We Follow this event in our FB Group here :

<https://www.facebook.com/groups/254653548367766/?ref=bookmarks>

73 de IW2BSF - [Rudy Parisio](#)



Historic Schooner that Carried Ham Radio on Arctic Expeditions Undergoing Additional Restoration

The nearly century-old schooner *Bowdoin*, built in 1921 and relaunched nearly 3 years ago, after some extensive renovation and refitting, is once again in dry dock to restore its hull. During explorer Donald B. MacMillan's Arctic Expedition of 1923 and on the MacMillan-McDonald-Byrd Expedition of 1925, the sailing vessel relied on Amateur Radio operators for communication. Built in East Boothbay, Maine, the *Bowdoin* has made more than two dozen visits to the Arctic under MacMillan's command. It was named after MacMillan's alma mater, Bowdoin College, and has become the official vessel of the state of Maine, a national historic landmark, and the flagship of the Maine Maritime Academy (MMA) Vessel Operations and Technology Program. Work on the vessel is currently under way at Boothbay Harbor.

"Our goal is to maintain the boat to the highest standard, to go above and beyond in order to preserve this living piece of history," MMA Marine Operations Manager Dana Willis said in a December media release. One such preservation update has been supplementing *Bowdoin's* sails with a diesel engine.

In 1923, MacMillan had turned to ARRL for help in outfitting his expedition with better wireless gear, and, as Michael Marinaro, WN1M, explained in his June 2014 *QST* article, "Polar Exploration," that help "was enthusiastically provided." ARRL Co-Founder Hiram Percy Maxim and the ARRL Board agreed to furnish support and recruited Donald H. Mix, 1TS, of Bristol, Connecticut, to serve as the shipboard operator. Board member M.B. West custom-designed the equipment, which was built by radio amateurs at his firm, Zenith Electronics. The transmitter operated on medium-wave frequencies with a power of 100 W and used the call sign WNP -- for "Wireless North Pole."



At Wiscasset, Maine, with the schooner *Bowdoin*, ARRL sponsors check out the receiver furnished by Zenith for the 1923 Arctic Expedition. From left to right: F.H. Schnell, 1MO, Traffic Manager; K.B. Warner, 9JT, Secretary-Manager, and Hiram Percy Maxim, 1AW, ARRL President.



The *Bowdoin* is launched from Wiscasset, Maine, for the 1923 MacMillan Arctic Expedition.

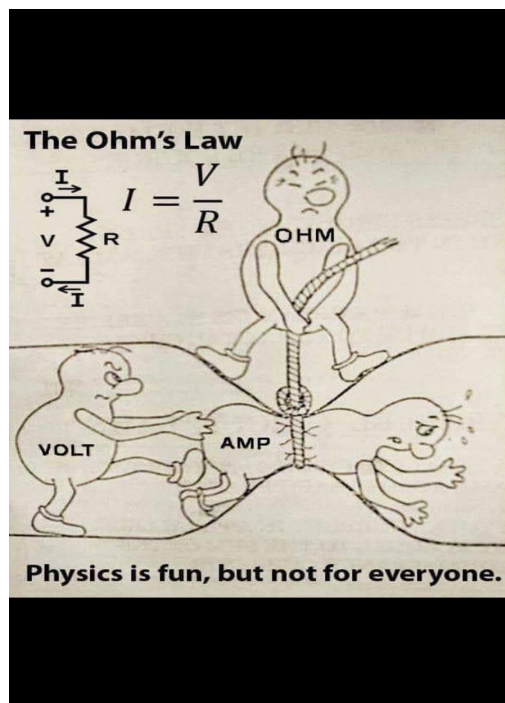
As Marinaro explained in his article, "WNP transmitted weekly 500-word press releases and listings of stations worked and heard. Once received by amateur

stations, these reports were delivered to local affiliated newspapers of the North American Newspaper Alliance; from there, they were distributed syndicate-wide by telegraph."

In 1925, the *Bowdoin* headed to Greenland. "The outstanding accomplishment of the expedition was in the sphere of radio," Marinaro wrote. "Utilizing shortwaves, the expedition was in consistent contact with the outside world throughout the journey, to the delight of the amateurs who were able to work them. The phenomenal success proved

to the Navy that shortwaves were definitely superior to the long and ultra-long waves on which the fleets had been relying."

The *Bowdoin* is expected to be seaworthy again for the summer sailing season, when it will serve once again in MMA sail training courses. -- *Thanks to Maine Maritime Academy ARRL News January 2019*



This is how it works!

UP – COMING ACTIVITIES AND HAMFESTS

01/19/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

02/16/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

03/12/2019 -- 1900 Johnson Co. Storm Spotter Training

Johnson County Sheriff's Dept. Training Facility Franklin, IN 46131.

03/16/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

04/20/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

05/18/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

05/17,18 ,19/2019 – Dayton Hamvention, Greene County Fairgrounds and Expo Center in Xenia,OH

06/15/2019 -- 0800 MARC Monthly meeting at the Johnson County REMC.

Johnson County REMC 750 International Drive Franklin, IN 46131.

CLUB DUES FOR 2019

It is that time of year for your dues for the Mid-State Amateur Radio Club. The dues are still \$18.00 and they have remained that amount for many years. This also a good time to update any of your information for club records such as licence upgrade, change of address or call sign.

This is also a good opportunity for new amateurs to join our club and join in our club activities for 2019.

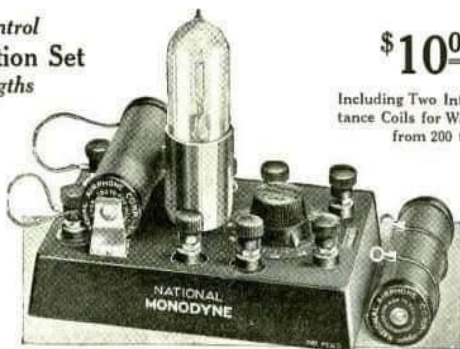
Please see Ron Scheutz, K9THR
M.A.R.C. Treasurer

A Triumph in Radio The Single Tube Radio Frequency Receiver Performs the Function of 2-Tubes

Only One Control
Ideal Vacation Set
All Wave Lengths

\$10⁰⁰ Without
Tube

Including Two Interchangeable Inductance Coils for Wave Lengths ranging from 200 to 600 Meters



SEE HOW ON THE MONODYNE
Gentlemen: Having purchased your Monodyne set I am sure that almost any of the radio stations you like, I think it is one of the best one-tube sets on the market today.
I have tested the receiver long distance stations - WXYZ, Kalamazoo, MI; WXYZ, Chicago, ILL; WXYZ, Philadelphia, PA; WXYZ, New York, NY; and a Spanish station whose call sign I could not recall.
Using head-up No. 1 gives very selective tuning and volume. This set proves to be a real find.
WILLIAM BROWN
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NATIONAL
MONODYNE
PAT. TRADE MARK PDG.
TUBE SET
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Entirely new circuit. The single tube performs the double function of radio frequency amplifier and detector.
Simplicity and Economy. One simple tuning control gives selectivity equal to sets costing hundreds of dollars.

The **MONODYNE CIRCUIT** is one of the most radical advances in radio engineering since the advent of the Armstrong Circuit. Parts heretofore considered essential are omitted and one simple tuning control gives a selectivity equal, if not superior, to that of sets costing hundreds of dollars. A child can operate it.

SIMPLICITY

The **NATIONAL MONODYNE** uses but one dry cell tube, interchangeable the WD-12 or any other standard dry cell tube, such as the UV-19 or C-299 types. Local broadcasting comes in astonishingly loud and clear, without distortion.
The tube socket is of a new design and most practical because it holds the tube with a positive grip on all four prongs for a depth of more than one quarter of an inch.
The **NATIONAL MONODYNE AIRPHONE** will find special favor with experimenters because of its adaptability in many different hook-ups, a thing not possible with any other low priced outfit.

LONG DISTANCE

In our New York laboratory tests, we repeatedly heard stations KVV at Chicago, WOC at Davenport, Iowa, and many others, quite loud and clear. This without resorting to any mode of amplification.
The **NATIONAL MONODYNE** is the most practical tube set made, and a complete set of details. It is only 6 1/2 inches long, 4 1/2 inches wide, and 2 1/2 inches high of durable, compact and rugged construction. The entire casing is moulded from hard rubber composition.
The **NATIONAL MONODYNE** has a receiving capacity and range of about 1500 miles. 75-foot aerial is recommended for best results.

No more Hunting for stations. You know in advance at what point of the scale your favorite station is located - only the highest priced sets accomplish this.

Dealers, Jobbers and Distributors - Send for Samples and Prices

SEND NO MONEY

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Gentlemen:
Please send me prepaid One (1) NATIONAL MONODYNE tube set, Model GT-1, for which I will pay the postman \$10.00.

NAME

STREET AND NO.

CITY STATE

NATIONAL
AIRPHONE
CORPORATION
18 HUDSON ST. NEW YORK



MID-SATE AMATEUR RADIO CLUB

The Mid-State Amateur Radio Club meets the **THIRD SATURDAY** of each month at the Johnson County REMC 750 International Drive Franklin, IN 46131.

See our website, www.midstatehams.org, for maps on how to get to our meeting.

Everyone is welcome; you do not have to be a *HAM* to attend our meetings or a member of the club.

WA9RDF Repeater:

146.835/
146.235 MHz
(151.4 Hz PL Tone)

Club Officers:

President: Jacki Frederick – KI6QOG
Vice President: Bill Jackson – KM6CRL
Secretary: Rhonda Curtis – WS9H
Treasurer: Ron Scheutz – K9THR
Repeater Trustee - Chris Frederick – KQ9Y

WA9RDF Repeater:

443.525/
448.525 MHz
(151.4 Hz PL Tone)

Weekly Net: Sunday evening 7:00 PM ARES/RACES members and ALL RADIO AMATEURS
146.835/146.235 MHz (151.4 Hz PL Tone)

The Official Newsletter of the Mid-State Amateur Radio Club

P.O. Box 836
Franklin, Indiana
46131

Spark Gap Editor: Robert LaGrange N9SIU

Please send your articles to my email: n9siu@yahoo.com no later than the 3rd of the month



Special thanks to Johnson County REMC for the use of their community room for meetings and testing.